

Time Table Sea-truthing course Askö Laboratory, Sweden, 16 -23 May 2010

Sunday, 16 May 2010

- 14:00 Boat from Uttervik to Askö
- 14:20-15:40 Arrival at Askö; find rooms/introduction to Askö
- 17:00- 17:15 Welcome and introductions
- 17:15- 18:00 **Lecture 'Introduction to remote sensing of the Baltic Sea'**
(Susanne Kratzer)
- 18:20-19:20 Dinner
- 19:20-20:00 The Science of Ocean Colour, Film by Roland Doerffer, GKSS, Germany

Mon, 17 May 2010

- 8:00-8:45 Breakfast
- 8:45-9:45 **Lecture on spatial statistics** (John Lewis)
- 10:00-10:45 **Lecture 'Bio-optical properties of coastal waters'** (Ajit Subramaniam)
- 10:45- 11:00 Coffee break
- 11:00-11:30 Seminar '**Remote Sensing and optical properties of lakes**' (Krista Alikas)
- 11:30-12:45 **Lecture 'Bio-optical properties of the NW Baltic Sea – a Case study'** (Susanne Kratzer)
- 13:00-14:00 Lunch
- 14:00-14:45 **Lecture 'Metrology in ocean optics'** (Gerald Moore)
- 14:45-15:15 Seminar on Trios measurements (Ilmar Askö)
- 15:15-15:30 Coffee break
- 15:30-16:30 Short film (12 min) on sea-truthing with Searcher
- 16:30-16:50 Seminar '**How to plan a sea-truthing campaign**' (Susanne Kratzer)
- 17:00-18:00 Dinner
- 18:00-19:00 Seminar '**CDOM in the Baltic Sea- spatial and temporal variations** (Piotr Kowalcuk); safety briefing for Oceania

Tues, 18 May 2010

- 8:00- 9:00 Breakfast
- 9:30-15:30 **'Sampling for sea-truthing and intercalibration of radiometers' (station B1 and H2)**
- 15:30-16:00 Coffee break/sandwiches at Askö
- 16:00-19:00 **Lab filtration at Askö (chl, SPM, CDOM)**

Wed, 19 May 2010

- 8:00- 9:00 Breakfast
- 9:00-11:00 Speed talks: students presenting their projects
- 11:00-11:45 Seminar on **optical measurements** in the lab (Susanne Kratzer)
- 12:00-13:00 Lunch

13:15-14:00 Lab measurements CDOM (Group I)
 14:15-15:00 Lab measurements CDOM (Group II)
 15:15-16:00 Lab measurements chlorophyll (Group I)
 16:15-17:00 Lab measurements chlorophyll (Group II)
 18:00-19:00 Dinner

Thursday, 20 May 2010

Group Exercises (Suse, Gerald, Ajit)
 Group I) a) work out chlorophyll concentration b) work out g_{440} (CDOM)
 Group II) Gerald: derive K_d PAR from LICOR and K_d490 from TACCS measurements, c) work out error budgets of total SPM
 Group III) Ajit: forward modelling: deriving reflectance from known concentrations of in-water optical components

Fri, 21 May 2010

9.30-15:30 'Optical transect CI-CII-CIII (Limanda) or BII;BIII; BY31 (Oceania)
 15:30-16:00 Coffee break/sandwiches at Askö
 16:00-19:00 Lab filtration at Askö (chl, SPM, CDOM)

Saturday, 22 May

9:30-12:00 Group Exercises (Suse, Gerald, Ajit):
 Group I) a) work out chlorophyll concentration b) work out g_{440} (CDOM)
 Group II) Gerald: derive K_d PAR from LICOR and K_d490 from TACCS measurements, c) work out error budgets of total SPM
 Group III) Ajit: forward modelling: deriving reflectance from known concentrations of in-water optical components

12:00-13:00 Lunch

13:00-15:30 Reassemble into groups

15:30-18:00 Start writing cruise report (group assignment), will be continued and submitted by e-mail (deadline: 14 June 2010)

Start packing up your things and cleaning room, ready for tomorrow.

19:00 Course dinner

Sunday, 23 May 2010

8:00-9:00	Breakfast
9:30-11:00	Final clean up of lab and rooms and packing personal belongings
11:00	Taxi boat to Uttervik
11:20	Leave Uttervik by coach -

Lecturers:

- Susanne Kratzer (Associate Professor), NordAquaRemS coordinator, Department of Systems Ecology, Stockholm University, Sweden; Suse@ecology.su.se
- John E. Lewis (Professor Emeritus), McGill University, Montreal, Canada, john.lewis02@gmail.com
- Ajit Subramaniam (Doherty Associate Research Scientist), Lamont Doherty Earth Observatory at Columbia University, USA, ajit@ldeo.columbia.edu
- Gerald Moore (Researcher), Bio-Optika, Gunnislake, UK, Member of MERIS Data Quality Working Group geraldmoore@gmail.com
- Piotr Kowalczyk (Associate Research Scientist), Institute of Oceanology PAS, Poland; piotr@iopan.gda.pl
- Krista Alikas (PhD student) Tartu Observatory, alikas@ut.ee
- Ilmar Ansko (PhD student) Tartu Observatory, jazov@aai.ee

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